

**Revise Regulatory Guide 1.201
Guidelines for Categorizing Structures, Systems, and
Components in Nuclear Power Plants According to Their Safety
Significance**

**Develop an Alternative Risk-Informed
Approach to Special Treatment Requirements
in 10 CFR Part 50**

Description

In 1998, the Commission decided to consider promulgating new regulations that would provide an alternative risk-informed approach for special treatment requirements in the current regulations for power reactors. The final rule (10 CFR 50.69, "Risk-informed categorization and treatment of structures, systems and components [SSCs] for nuclear power reactors"), was published in the *Federal Register* on November 22, 2004 (69 FR 68008). The NRC staff issued Regulatory Guide (RG) 1.201, Guidelines for Categorizing Structures, Systems, and Components in Nuclear Power Plants According to Their Safety Significance, Revision 1, on April 28, 2006.

The staff completed its review of Westinghouse topical report WCAP-16308-NP (Revision 0, July 2006), "Pressurized Water Reactor Owners Groups 10 CFR 50.69 Pilot Program – Categorization Process – Wolf Creek Generating Station," and issued its final safety evaluation on March 26, 2009 (ADAMS Accession No. ML090260674). By letter dated December 6, 2010, Southern Nuclear Company (SNC) informed the NRC of its intent to submit a license amendment request for implementation of 10 CFR 50.69 for Vogtle Units 1 and 2 and requested pilot plant status and a waiver of review fees. By letter dated June 17, 2011, the staff informed SNC that the NRC has granted the fee waiver request for the proposed licensing action in accordance with 10 CFR 170.11(b). SNC submitted the licensing action request on August 31, 2012. Following the initial pilot application, lessons learned from the application review will be used to revise the associated industry guidance and RG 1.201.

In addition, the NRC staff issued draft Inspection Procedure 37060, "10 CFR 50.69 Risk-Informed Categorization and Treatment of Structures, Systems, and Components Inspection," on February 16, 2011. NEI and one licensee provided comments on the procedure. The NRC staff addressed the comments and issued the revised inspection procedure in 2011. The NRC will focus its inspection efforts on the most risk significant aspects related to implementation of 10

CFR 50.69 (i.e., proper categorization of SSCs and treatment of Risk-Informed Safety Class (RISC)-1 and RISC-2 SSCs). Additionally, the inspections are expected to be performance-based, with SSCs of lower safety significance (e.g., classified RISC-3) not receiving a major portion of inspection focus unless adverse performance trends are observed.

The staff recognizes the need for an effective, stable, and predictable regulatory climate for the implementation of 10 CFR 50.69. The NRC views inspection guidance developed with industry stakeholder input as an efficient vehicle for reaching a common understanding of what constitutes an acceptable treatment program for SSCs since specific treatment plans are not reviewed as part of a licensee's application to implement 10 CFR 50.69. During the pilot application review, the staff continued to work with the industry and pilot licensee to modify the inspection procedure to reflect lessons learned and information gleaned from the pilot's proposed treatment program.

By letter dated December 17, 2014, (ADAMS Accession No. ML14237A034) the NRC staff issued a License amendment to SNC revising the licensing basis for the VEGP by adding license conditions that allow for the voluntary implementation of the regulation in Title 10 of the Code of Federal Regulations (10 CFR) Section 50.69, "Risk-informed-categorization and treatment of structures, systems and components for nuclear power reactors." Other licensees have expressed some interest but no other LAR has been submitted. The NRC completed the review of possible changes to RG 1.201 in support of the "Regulatory Guide Periodic Review." The review concluded that the Regulatory Guide could be updated but identified no safety concerns if the Guide is not updated. The NRC Staff did not recommend an update because no additional LARs have been submitted.